

In the Claims

1. [Previously Presented] A method of registering a user with a communication system, the method comprising:

in a portable user device, receiving a user registration input;

in the portable user device, initiating a telephone call in the communication system by automatically transferring audible call tones from the portable user device to a telephone device in response to the user registration input;

in the portable user device, transferring audible user identification tones over the telephone call;

in a control system, answering the telephone call;

in the control system, receiving the audible user identification tones;

in the control system, receiving a location indicator;

in the control system, processing the audible user identification tones and the location indicator to generate a route instruction; and

in the control system, transferring the route instruction to the communication system, wherein the route instruction routes telephone calls for the user to a communication device associated with the location indicator.

2. [Previously Presented] The method of claim 1 wherein transferring the audible user identification tones over the telephone call comprises:

in the control system, transferring answer tones over the telephone call in response to answering the telephone call; and

in the portable user device, receiving the answer tones over the telephone call, and in response, automatically transferring the audible user identification tones from the portable user device and over the telephone call.

3. [Previously Presented] The method of claim 1 wherein transferring the audible user identification tones over the telephone call comprises waiting for a time period after transferring the audible call tones for the telephone call to be established and then transferring the audible user identification tones from the portable user device and over the telephone call.

4. [Previously Presented] The method of claim 1 wherein receiving the location indicator in the control system comprises receiving Automatic Number Identification (ANI) from a telephone network indicating a telephone number of the telephone device.

5. [Previously Presented] The method of claim 1 wherein receiving the location indicator in the control system comprises:

in the control system, transferring location request tones over the telephone call to the telephone device if Automatic Number Identification (ANI) is not available;

in the portable user device, receiving the location request tones from the telephone device, and in response, indicating to the user that input of the location indicator is required; and

in the control system, receiving location tones from the telephone device representing the location indicator.

6. [Previously Presented] The method of claim 5 further comprising, in the portable user device, receiving a user location input, and in response, transferring the location tones to the telephone device.
7. [Previously Presented] The method of claim 5 wherein the location indicator comprises a telephone number of the telephone device.
8. [Previously Presented] The method of claim 1 further comprising:
- in the control system, processing the audible user identification tones and the location indicator to transfer acceptance tones over the telephone call; and
 - in the portable user device, receiving the acceptance tones over the telephone call, and in response, indicating successful registration to the user.
9. [Original] The method of claim 1 wherein the communication device comprises another telephone.
10. [Original] The method of claim 1 wherein the communication device comprises a computer.
11. [Original] The method of claim 1 wherein the communication device comprises a video terminal.

12. [Original] The method of claim 1 wherein the communication device comprises a facsimile machine.

13. [Original] The method of claim 1 wherein the communication device comprises a LAN printer.

14. [Original] The method of claim 1 wherein the communication device comprises a network drive.

15. [Previously Presented] A method of operating a portable user device to register a user with a communication system, the method comprising:

receiving a user registration input in a device controller of the portable user device;

in response to the user registration input, the device controller transferring a call signal to a tone generator of the portable user device and transferring a user identification signal to the tone generator;

receiving the call signal in the tone generator;

in response to the call signal, the tone generator transferring audible call tones from the portable user device to a telephone device to initiate a telephone call;

receiving the user identification signal in the tone generator from the device controller,

in response to the user identification signal, the tone generator transferring audible user identification tones from the portable user device to the telephone device.

16. [Original] The method of claim 15 wherein transferring the user identification signal to the tone generator further comprises:

receiving answer tones in the tone detector, and in response, transferring an answer signal to the device controller; and

receiving the answer signal in the device controller, and in response, transferring the user identification signal to the tone generator.

17. [Previously Presented] The method of claim 15 further comprising:

receiving acceptance tones in the tone detector, and in response, transferring an acceptance signal to the device controller;

receiving the acceptance signal in the device controller, and in response, transferring an indication signal to an indicator of the portable user device; and

receiving the indication signal in the indicator, and in response, indicating successful registration to the user.

18. [Original] The method of claim 15 further comprising:

receiving location request tones in the tone detector, and in response, transferring a location request signal to the device controller;

receiving the location request signal in the device controller, and in response, transferring an indication signal to the indicator; and

receiving the indication signal in the indicator, and in response, indicating to the user that input of a location indicator is required.

19. [Previously Presented] The method of claim 18 wherein the location indicator comprises a telephone number of the telephone device.

20. [Previously Presented] The method of claim 18 further comprising:

receiving a user location input representing the location indicator in the device controller, and in response, transferring a location signal to the tone generator;

receiving the location signal in the tone generator, and in response, transferring location tones representing the location indicator from the portable user device to the telephone device.

21. [Previously Presented] A communication system for registering a user, the communication system comprising:

a portable user device configured to receive a user registration input, automatically transfer audible call tones from the portable user device to a telephone device in response to the user registration input to initiate a telephone call in the communication system, and to transfer audible user identification tones from the portable user device and over the telephone call; and

a control system configured to answer the telephone call from the portable user device, receive the audible user identification tones, receive a location indicator, and in response, process the audible user identification tones and the location indicator, generate a route instruction, and transfer the route instruction to the communication system, wherein the route instruction routes telephone calls for the user to a communication device associated with the location indicator.

22. [Previously Presented] The communication system of claim 21 wherein:

the control system is configured to transfer answer tones over the telephone call in response to answering the telephone call;

the portable user device is configured to receive the answer tones over the telephone call, and in response, automatically transfer the audible user identification tones from the portable user device and over the telephone call.

23. [Previously Presented] The communication system of claim 21 wherein the portable user device is configured to wait for a time period after transferring the audible call tones

for the telephone call to be established and then transfer the audible user identification tones over the telephone call.

24. [Previously Presented] The communication system of claim 21 wherein the control system is configured to receive Automatic Number Identification (ANI) from a telephone network indicating a telephone number of the telephone device as the location indicator.

25. [Previously Presented] The communication system of claim 21 wherein:

the control system is configured to transfer location request tones over the telephone call if Automatic Number Identification (ANI) is not available, and to receive location tones from the telephone device representing the location indicator; and

the portable user device is configured to receive the location request tones from the telephone device, and in response, indicate to the user that input of the location indicator is required.

26. [Previously Presented] The communication system of claim 25 wherein the portable user device is configured to receive a user location input from the user, and in response, transfer the location tones to the telephone device.

27. [Previously Presented] The communication system of claim 25 wherein the location indicator comprises a telephone number of the telephone device.

28. [Previously Presented] The communication system of claim 21 wherein:

the control system is configured to process the audible user identification tones and the location indicator to transfer acceptance tones over the telephone call; and

the portable user device is configured to receive the acceptance tones over the telephone call, and in response, indicate successful registration to the user.

29. [Original] The communication system of claim 21 wherein the communication device comprises another telephone.

30. [Original] The communication system of claim 21 wherein the communication device comprises a computer.

31. [Original] The communication system of claim 21 wherein the communication device comprises a video terminal.

32. [Original] The communication system of claim 21 wherein the communication device comprises a facsimile machine.

33. [Original] The communication system of claim 21 wherein the communication device comprises a LAN printer.

34. [Original] The communication system of claim 21 wherein the communication device comprises a network drive.

35. [Previously Presented] A portable user device for registering a user with a communication system, the portable user device comprising:

a device controller configured to receive a user registration input, and in response, transfer a call signal and transfer a user identification signal; and

a tone generator configured to receive the call signal, and in response, transfer audible call tones from the portable user device to a telephone device to initiate a telephone call in the communication system, to receive the user identification signal from the device controller, and in response, transfer audible user identification tones from the portable user device to the telephone device and over the telephone call.

36. [Previously Presented] The portable user device of claim 35 wherein:

the tone detector is configured to receive answer tones from the telephone device, and in response, transfer an answer signal to the device controller; and

the device controller is configured to receive the answer signal, and in response, transfer the user identification signal to the tone generator.

37. [Previously Presented] The portable user device of claim 35 wherein:

the tone detector is configured to receive acceptance tones from the telephone device, and in response, transfer an acceptance signal to the device controller;

the device controller is configured to receive the acceptance signal, and in response, transfer an indication signal; and further comprising

an indicator configured to receive the indication signal, and in response, indicate successful registration to the user.

38. [Previously Presented] The portable user device of claim 35 wherein:

the tone detector is configured to receive location request tones, and in response, transfer a location request signal to the device controller;

the device controller is configured to receive the location request signal, and in response, transfer an indication signal; and further comprising

an indicator configured to receive the indication signal, and in response, indicate to the user that input of a location indicator is required.

39. [Previously Presented] The portable user device of claim 38 wherein the location indicator comprises a telephone number of the telephone device.

40. [Previously Presented] The portable user device of claim 38 wherein:

the device controller is configured to receive a user location input representing the location indicator, and in response, transfer a location signal to the tone generator;

the tone generator is configured to receive the location signal, and in response, transfer location tones representing the location indicator from the portable user device to the telephone device.